CLAIMS

1. A method for generating monoclonal antibodies in a rodent comprising the steps of:

a) administering a dendritic cell expansion agent to the rodent;

b) administering a dendritic cell maturation agent to the rodent;

c) immunizing the rodent with an antigen; and

d) isolating antigen-specific antibodies.

2. The method of claim 1 wherein the dendritic cell expansion agent is Flt3 ligand (Flt3L).

3. The method of claim 2 wherein Flt3L is administered in combination with another dendritic cell expansion agent.

4. A method for generating monoclonal antibodies in a rodent comprising the steps of:

a) administering a dendritic cell maturation agent to the rodent;

b) immunizing the rodent with an antigen; and

c) isolating antigen-specific antibodies.

5. The method of claim 1 or 4 further comprising the step of administering a CD40 agonist post-immunization.

6. The method of claim 1 or 4 wherein the dendritic cell maturation agent is a type I interferon, tissue necrosis factor-α, interleukin-6, prostaglandin-E2, interleukin-1α, interleukin-1β, interleukin-18, interleukin-12, interleukin-4, interleukin-23, interferon-γ, granulocyte-macrophage colony-stimulating factor or dendritic cell associated maturation factor agonist monoclonal antibody.

7. The method of claim 6 wherein the dendritic cell maturation agent is adminstered singly or in combination with

another dendritic cell maturation agent.

8. The method of claim 6 wherein the dendritic cell associated maturation factor agonist monoclonal antibody is anti-CD40.

9. The method of claim 6 wherein the type I interferon is interferon-α (IFN-α), interferon-β (IFN-β), IFN-δ, IFN-α1, IFN-α2, IFN-α2a, IFN-α2b, IFN-α4, IFN-αII1, IFN-αCon1, IFN-αLE, IFN-αLy or IFN-β2.

10. The method of claim 9 wherein the type I interferon is a combination of IFN-α and IFN-β.

11. The method of claim 1 or 4 wherein the rodent is a mouse.

12. The method of claim 1 wherein the mouse is a C57BL/6 mouse.

13. The method of claim 4 wherein the mouse is a C57BL/6 mouse or a BALB/c mouse.

14. The method of claim 12 wherein the mouse is a transgenic mouse.

15. The method of claim 12 wherein the mouse is a knockout mouse.

16. The method of claim 12 wherein the mouse is a severe combined imumunodeficient mouse.

17. The method of claim 12 wherein the mouse is a recombination activation gene deficient mouse.

18. The method of claim 1 or 4 wherein the rodent is a rat.

19. A method for generating antibodies in a C57BL/6 mouse

comprising the steps of sequentially:

a) administering Flt3L to the mouse;

b) administering a combination of IFN-α and IFN-β to the mouse;

c) immunizing the mouse with an antigen; and

d) isolating antigen-specific antibodies.

20. A method for generating antibodies in a C57BL/6 mouse comprising the steps of sequentially:

a) administering Flt3L to the mouse;

b) administering a combination of IFN-α and IFN-β to the mouse;

c) immunizing the mouse with an antigen;

d) administering a CD40 agonist; and

e) isolating antigen-specific antibodies.

21. A method for generating antibodies in a BALB/c mouse comprising the steps of sequentially:

a) administering a combination of IFN-α and IFN-β to the mouse;

b) immunizing the mouse with an antigen;

c) administering a CD40 agonist; and

d) isolating antigen-specific antibodies.

22. The method of claim 19 or 20 wherein Flt3L is administered in an amount of about 8.8 μg to about 10 μg per day over a period of about 10 days to about 14 days.

23. The method of claim 19, 20 or 21 wherein the IFN-α/β combination is administered in an amount of about 10^5 U to about 2 x 10^5 U each of IFN-α and IFN-β daily for about 3 days to about 5 days.

24. The method of claim 20 or 21 wherein the CD40 agonist is an anti-CD40 antibody.

25. The method of claim 24 wherein the anti-CD40 antibody is

administered in an amount of about 50 μg to about 100 μg per dose.